Settling NRD Claims by Appropriately Valuing Injury and Damages

Suzanne C. Lacampagne and Jeffrey C. Miller

Claims for natural resource damages (NRD) can range from thousands to hundreds of millions of dollars. At the high end, ExxonMobil’s NRD settlement totaled more than $900 million after the 1989 Exxon Valdez oil spill in Alaska. In 2008, Montana and the United States settled with ARCO for $168 million for NRD claims at Montana mining sites. Many other state and federal NRD claims have been brought, litigated, and settled over the years for varying amounts. See Daniel W. Smith, Status and Trends of CERCLA Related Natural Resource Damage Assessments, 4:3 ABA Superfund & Hazardous Waste Committee Newsletter (May 2003), available at www.abanet.org/environ/committees/superfundnatresdamages/newsletter/may03/status. One way to successfully settle NRD claims is to find a cost-effective restoration project that will produce the equivalent of the natural resource that was damaged or better. To do so requires a valuation of natural resource injury, damages, and the restoration project.

Under the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA), persons are liable for cleanup costs as well as “damages for injury to, destruction of, or loss of natural resources, including the reasonable costs of assessing such injury, destruction, or loss.” 42 USC § 9607(a)(4)(C). CERCLA authorizes the federal government, the states, and the Indian tribes to act as trustees and recover for NRD, although recovered sums must be used only to “restore, replace, or acquire the equivalent of such natural resources.” 42 USC § 9607(f)(1). Several other statutes give authority to trustees to recover for such injuries, including the Oil Pollution Act of 1990; however, this article focuses on CERCLA NRD claims.

The following are the elements of a CERCLA cost-recovery claim: (1) a release or threatened release (2) of a hazardous substance (3) from a vessel or a facility (4) that causes the incurrence of response costs, (5) if the defendant falls within at least one of four classes of responsible parties. To recover damages for injuries to natural resources, in addition to proving the presence of these five elements, the plaintiff must show that the natural resource within its trusteeship was injured and that the injury resulted from the release of a hazardous substance. This additional element requires plaintiffs to show causation, unlike the strict liability that applies to the recovery of response costs under CERCLA.

CERCLA allows trustees to recover damages for injuries to natural resources as well as the reasonable cost of assessing the injuries. Damages include the amounts necessary to restore, replace, or acquire the equivalent of the damaged resources as well as amounts necessary to compensate for the loss of services that the injured natural resources would have provided between the time of injury and full restoration or replacement. CERCLA authorizes the president to promulgate regulations for assessing damages from injuries to natural resources. Trustees do not have to follow the regulations, but if they do, there is a rebuttable presumption in favor of the trustees in administrative and judicial proceedings. The Department of Interior has promulgated detailed regulations, which are codified at 43 C.F.R. part 11. There are two sets of assessment procedures, one of which provides for simplified assessments requiring minimal field observation under Section 301(c).

Type A assessments have very limited application, so this article focuses on the Type B assessment regulations. Both types of assessment, however, involve the same three steps: (1) injury determination, (2) injury quantification, and (3) damage determination.

The first step in an NRD assessment, injury determination, is a scientific process. The purpose of this phase is to “ensure that only assessments involving well documented injuries resulting from the discharge of oil or release of a hazardous substance proceed through” the full assessment process. 43 C.F.R. § 11.61(b). Three determinations are involved in this phase: whether the resource is a covered natural resource, whether the resource is injured, and what the pathway was or is between the source of the release and the injured natural resource.

“Injury” is defined broadly to include any “measurable adverse change . . . in the chemical or physical quality” of the resource resulting from the release. 43 C.F.R. § 11.14(v). In order to determine whether a resource has been injured, the rules set out a list of “changes” that must be documented and associated “acceptance criteria.” For example, one way to show that surface water has been injured is to demonstrate a concentration of substances in excess of drinking water standards in water that was potable before the release. The acceptance criteria are the measurement of the contaminant in two samples using specified sample types. The rules include

Ms. Lacampagne is an attorney in the Portland, Oregon, office and Mr. Miller is an attorney in the Vancouver, Washington, office of Miller Nash LLP in the firm’s Environmental and Natural Resources Practice Group. They may be reached at suzanne.lacampagne@millernash.com and jeff.miller@millernash.com.
similar but more complicated change and acceptance criteria for biological resources. For example, a “change” in disease rates may be shown by demonstrating a statistically significant difference in fin erosion between fish in the assessment area and control-group fish. The common thread running through the injury determination regulations is the concept of a baseline. Injury must be demonstrated by comparing resources in the assessment area to the baseline condition of the resources.

The second step in an NRD assessment, quantification of injury, is also a scientific process and aims to quantify the effects of the release on the injured resource. Steps include measuring the extent or scope of the injury, determining the baseline condition and identifying the baseline services, determining the recoverability of the resource, and estimating the reduction in “services” attributable to the release. The term “services” refers to functions performed by the resource, including functions for human use. For example, “services” provided by clean water would include providing habitat for animals as well as recreation opportunities for humans.

After injury is shown and the reduction in services quantified, the final step is to make a damage determination. The purpose is to establish the amount of money to be sought in compensation for the NRD. It has been disputed whether this dollar amount should reflect the value of the injured resources or the cost to restore or replace them. The regulations now provide that the measure of damages is the amount of money necessary to (1) restore the resource so that it can provide the same level of service it did at baseline or (2) replace or acquire other natural resources capable of providing the same baseline services. Damages also include the value of the services lost between the time of the release and the full recovery or the replacement of the resource. Id. This second component of damages is often referred to as “compensable value” or “lost use value.” For instance, if it takes ten years to restore water quality to the baseline level, the trustees may obtain damages for the value of the degraded water quality during the ten-year period.

**Valuing Injury and Restoration: Habitat Equivalency Analysis**

Applying the concepts of steps 2 and 3, quantifying injury and determining damages, Habitat Equivalency Analysis (HEA) is a methodology for ensuring that restoration efforts are performed at the proper scale. In other words, HEA attempts to ensure that restoration projects create or restore the same quantity of natural resource services that were lost because of the release of hazardous substances. HEA can take into account the natural recovery of the damaged area as well as the fact that a restored area sometimes does not provide the same level of services as the damaged area. HEA also discounts the value of services to be provided in the future to obtain a present value of restoration projects.

Suppose that a release destroys one acre of eelgrass and that it is not feasible to actively restore it. Suppose further that one year after the injury, the eelgrass will begin to recover, and it will return to its baseline condition within ten years after the injury. Eelgrass provides various natural resource services, which can be measured in “service acres years” (SAYs). In its baseline condition, an acre of eelgrass provided one SAY every twelve months. In the first year after the injury, during which no recovery occurs, 1 SAY is lost. As the eelgrass recovers, less than one SAY is lost in each of the nine years of the recovery period, with the amount lost each year decreasing toward zero. HEA discounts services that will be either lost or provided in the future, typically at a 3 percent discount rate, to arrive at a present value measured in discounted service acres years (DSAYs). Thus, HEA analysts arrive at a present value, measured in DSAYs, of the lost services. The exact amount depends on the rate of recovery of the eelgrass. If it approaches baseline in the first year or two and then slowly recovers over the remaining years, the number of DSAYs will be relatively low. If it recovers very slowly at first and then quickly at the end, the number will be much closer to ten DSAYs. In either case, the number will be lower than ten because of the natural recovery and the discounting of services provided in the future.

An example from the Florida Keys National Marine Sanctuary illustrates the concept. *U.S. v. Fisher*, 977 F. Supp. 1193 (S.D. Fla. 1997). Treasure hunters used pipes called “mailboxes” to redirect the thrust from their propellers into the seabed in an effort to expose treasure. Over the course of several months, they used this technique to create over 600 holes in the seafloor that averaged 20 to 30 feet in diameter and 3 to 5 feet deep. Natural resource trustees calculated that 1.63 acres of seagrass were destroyed by these activities. The trustees also determined that restoration was not feasible and that it would take 50 to 100 years for the seagrass to recover naturally. HEA was then used to calculate that a total of 44.08 DSAYs were lost. A 1.55-acre restoration project was then designed to provide 44.08 DSAYs to make up for those lost as a result of the treasure-hunting activities.

After calculating the number of lost DSAYs, trustees typically assign a dollar value to a DSAY based on the cost of replacing the same number of DSAYs. For example, if 100 DSAYs were lost and the trustees could replace those DSAYs for $1 million, then the value assigned to each DSAY would be $10,000. A potentially responsible party (PRP) may then cash out by paying its allocated share of the DSAYs, or it can perform restoration projects that generate its allocated share of DSAYs. It is this second option that leads to positive settlement opportunities for PRPs. It is often far cheaper for PRPs to perform restoration than it is for the trustees, so PRPs may be able to generate DSAYs at a much lower cost than the dollar value assigned to DSAYs by the trustees.

**The Hylebos Waterway**

A good example of a restoration project that led to positive settlement opportunities for PRPs occurred at the Hylebos Waterway sediment site, part of the Commencement Bay Superfund Site in Tacoma, Washington. In that case, the state, federal, and tribal trustees (Trustees) at the Hylebos Waterway sought to recover damages for injury to natural resources, allegedly caused by contamination of the sediments, soils, and...
In 2002–03, after conducting a ten-year, $10 million partial NRD assessment (not a full-blown NRD assessment), the Trustees notified the PRPs of their NRD claims and demanded that the PRPs make a settlement offer or else the Trustees would conduct a full NRD assessment and potentially litigate. In their demand, the Trustees used an HEA to determine equivalency between lost and restored resources. Then they determined the scale of NRD liability associated with the Hylebos Waterway and the natural resource restoration efforts needed to compensate for the injury by using DSAYs. Ultimately, the Trustees sought to recover funds for projects needed to generate habitat restoration sufficient to compensate for the loss of 1,527 DSAYs. The Trustees told the PRPs that they could pay cash to settle their NRD liability at a cost of $52,000 per DSAY, and the Trustees would use that money for restoration projects. Thus, if all PRPs settled their liability by cashing out, the settlement cost would have been $79.4 million.

As an alternative, the Trustees told the PRPs that they could settle by doing restoration projects that would provide sufficient DSAYs to cover their liability. In fact, the Trustees strongly encouraged the PRPs to do restoration projects as opposed to cashing out because they believed that private parties could use market forces to do good restoration projects more efficiently and cost-effectively than the Trustees could.

In response, a number of the PRPs formed a PRP group and negotiated a settlement with the Trustees that provided a restoration project that would meet the Trustees’ goals and DSAY demands. U.S. v. AOL Express, Inc., No. 3:06-CV-05204-RJB (W.D. Wash. 2006). Determining the appropriate DSAY value of liability and the restoration project was not easy. Because the Trustees had allocated DSAY liability by property sites instead of by individual PRPs (many sites had numerous PRPs), the PRPs in the PRP group had to allocate and determine their respective DSAY liability and negotiate that liability with the Trustees as part of the settlement. Ultimately, the PRP group and the Trustees agreed that the PRPs’ collective allocated liability totaled approximately 258 DSAYs and $1.8 million in damage assessment costs (ultimately, about twenty-two PRPs joined the settlement, a subset of the total named PRPs).

In coordination with the Trustees, the PRP group found a habitat restoration project that would remove and relocate a levee and restore the natural flow of a leg of the Puyallup River, a tributary to Commencement Bay and habitat for fish alleged to have been injured at the Hylebos Waterway. The project created an estimated 66 acres of salmon-spawning habitat and created enough environmental benefits to more than cover the 258 DSAYs of liability attributed to the settling PRPs. The PRPs agreed to fund the project, which was performed by the landowner, Pierce County, Washington, and to ensure that the project was completed.

The advantage to the Trustees was that they received a high-value habitat restoration project that restored an equivalent amount of injured resources, without the Trustees’ having to find and complete a project on their own. Because the PRPs were able to quickly fund and support a pending project that Pierce County was ready to do, the project was completed quickly and efficiently, without much government bureaucracy or oversight costs. The Trustees benefited from having a project that was completed within about a year of the settlement that very effectively restored important fish habitat; it is unlikely that the Trustees could have designed, constructed, and completed such a project in such a short time.

The PRPs benefited by settling the case quickly, certainly in CERCLA NRD terms, and without litigation, by meeting the Trustees’ preference for a good restoration project. The PRPs also funded and completed the project at a much lower cost than a cash-out settlement—they funded $2.3 million of the project, paid $150,000 in Trustee oversight costs, and paid their own costs related to overseeing completion of the project. Had the PRPs settled by cashing out of their 258 DSAY liability, they would have owed the Trustees almost $13.5 million, or about six times the project cost. Instead, they funded and oversaw a project that cost significantly less but that had high DSAY value.

The PRPs did face the risk that the project would not be successful or would face cost overruns; cashing out obviously would have avoided that risk. The consent decree could not be terminated until the project was completed and made no exclusion for project cost overruns or problems with construction or permitting. The PRPs relied on Pierce County to complete the project using the PRPs’ funding and risked delaying resolution of their liability if Pierce County had not timely or successfully completed the project. In fact, the project was slightly delayed over a minor permitting problem, and the Trustees would not agree to terminate the decree until that was resolved. Ultimately, the project was successfully permitted and completed, and the consent decree settling the case was terminated in 2007 at no additional cost to the PRPs.

The success of the Hylebos Waterway settlement highlights the benefits to PRPs and governments of carefully valuing NRD claims and restoration projects that might be used to settle those claims. Finding and implementing high-value, cost-effective restoration projects is one creative way to quickly resolve what otherwise might be costly cash-out settlements or litigation over large NRD claims.